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ABSTRACT

Opinions of New York state public school music teachers were sought to (1) obtain an initial profile of the knowledge and skills needed and actually used by beginning music teachers in the areas of aural skills, written skills, combined aural and written skills, and theoretical knowledge of musical types; and (2) determine if this profile of knowledge and skill areas will vary when examined by area of specialization and level of teaching duties. Data were collected by questionnaires from randomly selected sample of the public school music teachers in the state. Of 400 inquiries, 208 response sheets were returned. An analysis of the data reveals that (1) the written skills associated with score reading, score preparation, and transportation are most needed and used; (2) the aural skills most needed are those of sightseeing and detecting errors of all types; and (3) there is a slight weighting toward the pop-commercial type of music in terms of need, but on the use side, folk, pop, and ethnic music are used most often. When examined by areas of both specialization and level of teaching duties, the differences are more a matter of degree than direction.  
 (Author/LBH)

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Music Theory Knowledge and Skills  
for Beginning Music Teachers:  
A Descriptive Survey Report

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1975

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## FOREWORD

The growing interest in the accountability movement has made the delineation of knowledge and skills that are of importance to the beginning teacher a matter of concern for both the music educator and researcher. The increased interest by many state education departments in the competency-based method of certification also has served to heighten this concern.

The Theory Survey described in this monograph was undertaken jointly by the Department of Music and the Teacher Education Research Center, State University College, Fredonia, New York. It is the first of a projected series of five studies that will ultimately examine a wide range of knowledge and skills that are of importance to the beginning music teacher. The information gathered from these studies will, hopefully, provide a framework for the development of both curricular programs and future research.

We are pleased to support this study and look forward to the continuation of this project.

Thomas H. Carpenter, Chairman  
Department of Music

Thomas A. Regelski, Chairman  
Music Education Department

Ronald E. Hull, Acting Director  
Teacher Education Research Center

## ACKNOWLEDGMENTS

A project of this nature could not be undertaken without the aid and cooperation of a number of individuals. While it is impossible to thank all who helped in the project, the work of several should be recognized. First, the music teachers of New York State who responded to the Questionnaire should be thanked for taking the effort to complete the survey while involved in busy teaching schedules.

Secondly, Ms. Marian Anderson who contributed to the typing of the monograph; Mr. Louis DeBonzo, for his efforts in the initial development and ultimate processing of the Questionnaire; and Ms. Merle Crumm who not only typed the Questionnaire and much of the monograph, but also processed response sheets, responded to Questionnaires that had not reached the correct individual, and in general, was able to keep the project running efficiently.

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## INTRODUCTION AND PURPOSE

A major criticism of the competency movement has been the lack of available research on which to base the development of programs. A search of the literature indicates that the amount of research examining this topic is extremely limited in both amount and depth. This is especially true as it applies to music programs. It was, therefore, the purpose of this study to take a first step in filling this gap by seeking input from public school music teachers with the ultimate goal of describing the areas of knowledge and skill felt to be the most needed and predominantly used by beginning music teachers.

## PLANNING

### Background Planning

The initial impetus for undertaking this project developed as a result of a New York State Education Department mandate indicating that certification was to be based on a competency concept. The Music Education Department at State University College, Fredonia, New York became involved when several members of the music education faculty attended a meeting at the State Education Department in Albany, New York, in the Spring of 1973.

During the Summer and Fall of 1973, a six-year plan (McMullen, 1973), was developed which outlined a procedure to examine the total competency concept. From this outline a one-year, \$40,000 research proposal (McMullen, 1974) was extracted. This proposal sought funding to gather input from college and field-centered

personnel regarding the areas of knowledge and skill felt to be important. The one-year proposal was not funded by either State or Federal agencies. Therefore, because of insufficient funds, it was necessary to reduce the study both in scope and depth to a size that could be accomplished by the Fredonia staff and resources. The information outlined in this monograph is the result of these efforts.

### Immediate Planning

In April, 1974, an in-service day for the Chautauqua County Music Teachers (New York) provided an opportunity for an initial meeting of college and field-centered personnel to deal with this mandate. Discussion groups, which were broken into areas of specialization, sought to define the areas of knowledge and skill of most importance to the music teacher. On the basis of input from this in-service day, panel discussions, previous research and input of the music education staff at Fredonia, an initial survey instrument was constructed (Pilot I).

This instrument (Pilot I) was administered to graduate students attending classes at Fredonia State University during the second summer session in 1974. Most of these students were music teachers furthering their preparation toward permanent certification and/or Master of Music degrees. Input from this pilot indicated that the project would need to be broken into separate sections since the number of items was too extensive for one questionnaire. After descriptive statistical analysis (item analysis, frequency tallies, and percentages) was completed and the results interpreted, the information gathered from the results

of Pilot I was incorporated into Pilot II. This pilot, a revision of the theory section of the Pilot I Questionnaire, was administered to graduate music students in September 1974. A third version (Pilot III) was then undertaken, incorporating modifications from Pilot II. This instrument was administered to all participants at a meeting of the Allegheny County Music Teachers Association (New York) in November 1974. Further slight revisions were made in the music theory instrument as a result of this study, which resulted in the survey instrument found in Appendix C.

#### SPECIFIC AIMS

The purpose of the theory survey was to describe the areas of knowledge and skills that are felt to be of primary importance to the beginning public school music teacher. Specifically, this study sought the opinions of New York State public school teachers:

1. To obtain an initial profile of the knowledge and skills needed and actually used by the beginning music teacher in the following areas:

- a. aural skills
- b. written skills
- c. combined aural and written skills
- d. theoretical knowledge of music types

2. To determine if the profile of knowledge and skill areas in aural skills, written skills, and theoretical knowledge of different types of music that are needed and actually used by the beginning music teacher vary when they are examined by:

- a. area of specialization of the respondent
- b. level of teaching duties of the respondent

METHOD

Population and Sample

A listing of public school teachers of music in New York State furnished by the State Education Department in Albany, New York, was used as the population. This listing was encoded by the Basic Educational Data System (BEDS), Assignment Codes for Teachers--Fall, 1973 (BEDS, 1973). Several factors were considered in drawing a sample from this population. First, since continued sampling was planned from the same population of teachers, each sample would need to be mutually exclusive. Secondly, the cost of mailing, envelopes, printing, and the logistical considerations in handling and processing the response sheets with limited personnel, restricted the size of the sample that could be utilized effectively.

The sample for this study was selected randomly from the total population of 7,263 public school music teachers in New York State. In order to obtain mutually exclusive samples, it was decided to use 2,000 teachers in the series of studies, or 400 in each of the studies. A random selection of 2,000 numbers drawn from the population was obtained via the primitive mixed function DEAL described in APL/360 User's Manual (IBM, 1960). The same procedure was used to divide the original set of 2,000 numbers into five sets. A set of 400 numbers identified the first sample from the population listing (BEDS), which previously had been numbered sequentially from 1 to 7,263 (i.e., the population size).

### Materials

The Questionnaire used in this study resulted from three pilot studies. In the development of this instrument, four considerations were used. First, information relating to the area of respondent specialization and level of teaching duties was necessary in order to examine differences attributed to these factors. Second, 50 to 60 content items were considered the maximum length in order to avoid a fatigue effect. Third, efficiency in handling was critical because of the size of the project. Fourth, and probably most important, it was decided that the study would explore knowledge and skill areas rather than specific competencies. If specific competencies were used, the size of the Questionnaire would have been prohibitive.

The Questionnaire finally developed for the theory study contained two sections: the first for gathering information about the respondent, and the second, containing content questions relating to aural skills, written skills, and theoretical knowledge of music types.

Information Section: Two types of information were to be gathered from this section of the Questionnaire. The first type sought was to determine the area of specialization and level of teaching duties for each respondent. This information was important in order to accomplish one of the specific aims of the study. The second type of information was general background material, such as years of teaching experience and number of music teachers in the system; this was intended to aid in describing the sample

which had responded to the Questionnaire. It was anticipated that an analysis of this information would give some insight about response patterns.

Content Section: This section was concerned with asking two basic questions: (1) the degree to which beginning music teachers need certain skills, and (2) the approximate amount of time beginning music teachers actually use these skills. An earlier pilot also contained a third question relating to the relative importance of skills in terms of use, but was subsequently dropped as the responses were highly correlated with the responses to items for the percentage of time used. The questions outlined above were used to gather information relating to three sub-areas of theory: aural skills, written skills, and theoretical knowledge of musical types. It was felt that these three areas most closely represented the areas of theory most often used in public schools and taught in college curriculums.

In the original pilots, a 7-point scale was used to obtain reactions to a specific skill or knowledge area. However, the pilot work indicated that the respondents felt a choice could be made more easily if given discrete categories. It was decided that the categories "of little or no importance," "relatively unimportant," "desirable if possible," and "imperative," would be used for the questions on need. The following categories were employed to determine the percentage of time knowledge and skills were actually used: 0 to 20%, 21 to 40%, 41 to 60%, 61 to 80%, and 81 to 100%. In an early pilot the times were broken into none, 1/4, 1/2, 3/4, and full-time, but it was felt that the revised

categories more closely reflected the situations of teachers in the public schools.

#### Procedures

The individuals selected for this study were sent a cover letter explaining the purpose of the project, a copy of the Questionnaire, a mark-sense response sheet (see Appendix C), and a stamped return-addressed envelope. The only identification marking on the response sheet was a four digit code number that was used to determine the unreturned list for a follow-up mailing.

Approximately four weeks after the initial mailing, a post-card was sent to those individuals who had not returned the material. As returns were received, the date of return was marked on the response sheet in the appropriate blocks. The mark-sense sheets were then scanned by an optical scanning device at the Computer Center, State University College at Fredonia, New York, and the data was entered directly into the computer for use in the analysis.

#### RESULTS AND DISCUSSION

It is not the intent of this monograph to provide a detailed examination of the data obtained from this study. To accomplish this, further analysis is projected and the results will be published separately. Thus, the material on the subsequent pages should be viewed as initial interpretations by the authors rather than conclusions drawn after a detailed examination of the data.

A total of 400 Questionnaires were sent to public school teachers in New York State. Of this number, 208 response sheets or 52% were returned. Two factors suggested that in the initial mailing of 400, some Questionnaires did not reach the individuals to whom they were sent. First, the original population listing was drawn from a 1973 listing of teachers, and some had undoubtedly moved. Therefore, the Questionnaires (mailed bulk-rate postage) would not have been forwarded. Secondly, after the follow-up postcard was sent, several individuals wrote to the director of the project indicating that they had not received the original mailing.

On response sheets containing missing data or marks in a response column for which there was no answer on the original Questionnaire, the following procedures were followed. For questions 1 through 8, which were "yes" or "no" responses relating to area of specialization or level of teaching duties, items which did not contain a response were considered to be a "no" response. In the need section, which contained four response categories, some responses were marked in the E column (column 5) on the mark-sense response sheet. These are listed in Appendix A in the error column and were not considered in the analysis of the data.

The computer program FORTAP (Bauman, 1970) was used to obtain the percentage of responses for each item. Analysis of the data by area of specialization was accomplished by the computer program NUCROS (Janda, 1965). The same program was used to obtain the analysis by level of teaching duties (questions 4 through 8) which resulted in 20 categories. The percentage of respondents

in each category of area and level of teaching duties are listed in Tables 1 and 2.

### Written Skills

An analysis of the data for written skills reveals several general trends that would appear to be consistent for need and use. First, skills associated with score reading, score preparation, and transposing, are the skills predominantly needed (61.1% to 74.3%, Imperative), and used (19.7% to 31.3% use 81-100%). A grouping which includes harmonization, editing, analysis, reducing and simplifying scores (Need: 39.9% to 60.1%, Imperative; Use: 8.2% to 11.5% use 81-100%) seems to form a second category. A third group of written skills associated with voice leading and part writing seem to be less needed (34.1% to 38.9%, Imperative) or used (3.4% to 4.8% use 81-100%) than the previous group. Finally, skills associated with composing, figured bass and counterpoint appear to be needed (9.6% to 14.9%, Imperative) and used (1.0% to 1.4% use 81-100%) to the least degree by beginning music teachers.

### Aural Skills

The teachers responding to this Questionnaire felt that the skills predominantly needed by beginning teachers are those of sight singing (81.3%, Imperative) and detecting errors (78.4% to 80.8%, Imperative). In terms of use, the skill of detecting errors would appear to be the most predominantly used (51.4% to 58.2% use 81-100%), while sight singing is used 81-100% of the

time by 39.4% of the respondents. The skills associated with taking dictation of all types seem to be the least needed (43.8% to 52.9%, Imperative) and used (9.1% to 10.1% use 81-100%). In summary, the detection of errors seems to be the predominant skill for the beginning teacher, followed closely by sight singing. Dictation of all types are needed and used to a lesser extent by music teachers.

#### Combined Aural and Written Skills

Combinations of aural and written skill areas that public school teachers feel are needed and used by the beginning music teacher were to be reported as a priority listing. When taken across all areas and levels of teaching duties, the following trend emerges, which is relatively consistent for both need and use. First, the most needed and used aural or written skills were detecting errors--regardless of whether it was melodic, harmonic or rhythmic, and sight singing. The percentage of respondents in these categories were the largest for any of the response categories in the survey. Second in importance, both in need and use, are the skills associated with score reading and preparation (including transposition). It was also quite evident that the aural and written skills needed and used the least are those of figured bass and counterpoint.

#### Theoretical Knowledge of Musical Types

It was the intention of this section to obtain data in relation to "historical" or "stylistic" variables in theory. The

data for the needs section, while giving a slight weighting toward the pop-commercial (as vs. serious) type of music, does not appear to present a trend. On the use side, a trend does appear to develop. Folk, Pop, and Ethnic music seem to be the music used most often by public school teachers (9.6% to 16.4% use 81-100%). These are followed by Jazz, Modern, Classical, Romantic, and Baroque (4.3% to 6.3% use 81-100%). At the bottom of the rank ordered list in terms of usage are Renaissance (3.4% use 81-100%) and Avant-Garde (2.9% use 81-100%).

#### Areas of Specialization

When examined by areas of specialization, the results of some areas should be considered with caution since several categories contain only a few respondents (see Table 1). For example, of the 208 responses only 12 were general music, 14 combined instrumental, general and choral/vocal, and 5 were instrumental-vocal. The two largest categories were 77 vocal/choral-general responses, and 56 instrumental.

Table 1

#### Percentage of 208 Respondents by Areas of Specialization

Instrumental	26.9%
Choral	10.6%
General	5.8%
Instrumental, Choral/Vocal	2.4%
Instrumental, General	10.6%
Choral/Vocal, General	37.0%
Instrumental, Choral/Vocal, General	6.7%

In general, the difference in theory knowledge and skills would appear to be a matter of degree of need or use rather than direction. For example, while all area categories had the largest percentage of use in the 81-100% column for detecting rhythmic errors, 46.8% of the vocal/choral-general respondents use it 81-100% of the time while 73.2% of the instrumental teachers use the skill this amount of time.

In the needs section, all of the differences were a matter of degree. In the use section, initial interpretation would appear to suggest that general and choral/vocal teachers use traditional theory skills such as harmonization and analysis to a greater extent than do instrumental teachers. The instrumental teacher is more concerned with skills associated with score preparation.

A complete listing of this data is beyond the scope or interest of this monograph. However, it is contained in a separate monograph (McMullen and Bauman, 1975b) and can be obtained by writing the authors.

#### Levels of Teaching Duties

When examined according to levels of teaching duties, the results in some categories also should be considered with caution. As shown in Table 2, the categories for post-secondary contain 1.4% or less of the respondents. Post-secondary was not used in establishing the categories for analysis of data by level because of the small percentage of respondents. The largest number of respondents was that of elementary teachers, which included 30.8% (or 64) of the respondents.

Table 2

Percentage of 208 Respondents by Levels of Teaching Duties

Elementary	30.8%
Middle	3.4%
Junior	19.9%
Senior	11.1%
Elementary, Middle	9.1%
Elementary, Junior	2.4%
Middle, Junior	2.9%
Junior, Senior	5.8%
Junior, Post-Secondary	.5%
Senior, Post-Secondary	1.0%
Elementary, Middle, Junior	4.8%
Elementary, Middle, Senior	.5%
Elementary, Junior, Senior	3.4%
Elementary, Senior, Post-Secondary	.5%
Middle, Junior, Senior	2.9%
Junior, Senior, Post-Secondary	.5%
Elementary, Middle, Junior, Senior	2.4%
Elementary, Middle, Senior, Post-Secondary	.5%
Elementary, Junior, Senior, Post-Secondary	.5%
Elementary, Middle, Junior, Senior, Post-Secondary	1.4%

Additionally, the levels of teaching duties do not appear to show one level clearly needing or using a skill or knowledge more than another. In other words, the differences were a matter of degree rather than direction. The one possible exception to this was in the skills associated with preparing scores. In this area, it would appear that the senior high school teachers use score preparation more than the elementary, middle, or junior high school teachers. Related skills such as transposing and score reading also tend to show this distinction, although to a lesser degree. As with the areas of specialization, a complete listing of this information is beyond the scope or intent of this monograph. However, a complete listing of this data is contained in a separate

monograph (McMullen and Bauman, 1975b), and can be obtained by writing the authors.

#### FINAL COMMENTS

It was the intent of this project to develop an initial profile of the knowledge and skills a beginning music teacher needs and uses, and to determine if this profile varies when examined across areas of specialization and levels of teaching duties. Such a profile cannot be completely established by a survey technique such as employed in this project. However, the results of the project do serve to "carve out" areas of importance. It will be the job of future research to more clearly define these areas and to determine if the resultant areas are actually of importance in developing an individual that is "successful" in teaching music to public school students.

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APPENDIX A  
Data Tables

Table 3  
PERCENTAGES FOR INFORMATION SECTION

Ques. No.	Area of Specialization	Yes	No	Omits
1	Instrumental	46.6	43.8	9.6
2	Choral/Vocal	56.7	34.6	8.7
3	General	60.1	29.3	10.6
<u>Level of Teaching Duties</u>				
4	Elementary School	56.3	35.6	8.2
5	Middle School	27.9	56.7	15.4
6	Junior High School	43.3	45.2	11.5
7	Senior High School	30.3	54.8	14.9
8	Post-Secondary School	4.8	76.4	18.8
<u>Additional Information</u>				
9	Music Teacher	89.9	1.0	1.0
10	Music Department Administrator	3.9	58.7	17.8
<u>Full-Time Part-Time</u>				
		Present	Past	Never
11	Non-Music Administrator	5.8	5.8	71.2
12	NYSSMA Member	57.2	23.6	13.9
13	County Music Association Officer	8.2	18.3	59.6
<u>0-2 Years 3-5 Years 6-9 Years 10 or more years</u>				
14	By the end of the current academic year, I will have taught	5.8	11.5	18.3
<u>School System Classification</u>				
15		Urban	Suburban	Rural
		26.0	44.2	26.9
		1-4	5-10	11 or more
		1.9	63.0	1.4
16	Number of Music Teachers in School District	10.1	26.4	62.0
				1.4

Table 4

PERCENTAGES FOR WRITTEN SKILLS

Indicate the degree to which you believe beginning music teachers NEED the following written skills in their teaching:

Rate the approximate amount of time you believe beginning music teachers USE these written skills in their teaching:

Written Skill	Ques. No.	Response Categories*					Ques. No.	Response Categories						
		Little	Relat.	Desir.	Imper.	Error		Omits	0-20%	21-40%	41-60%	61-80%	81-100%	Omits
Part Writing	(17)	2.9	13.5	44.2	38.9	0.0	0.5	(31)	46.6	26.0	16.4	7.2	3.4	0.5
Voice Leading	(18)	4.3	16.8	43.3	34.1	0.0	1.4	(32)	47.1	22.1	16.8	8.2	4.8	1.0
Harmonization	(19)	1.4	5.8	32.2	60.1	0.5	0.0	(33)	29.8	25.0	18.3	15.4	11.5	0.0
Figured Bass	(20)	20.2	35.1	32.2	11.5	0.0	1.0	(34)	73.6	15.4	5.8	2.9	1.4	1.0
Counterpoint	(21)	15.4	31.7	42.3	9.6	0.0	1.0	(35)	67.8	22.6	5.3	2.4	1.0	1.0
Analysis <sup>1</sup>	(22)	3.9	12.5	41.8	39.9	0.5	1.4	(36)	32.7	29.8	22.6	5.3	8.7	1.0
Arranging	(23)	1.4	3.4	51.0	43.3	0.5	0.5	(37)	24.5	35.1	24.0	11.1	4.8	0.5
Orchestrating	(24)	7.2	15.9	41.8	33.7	0.5	1.0	(38)	51.0	23.6	14.4	6.3	3.4	1.4
Composing	(25)	12.0	26.0	46.6	14.9	0.0	0.5	(39)	65.4	21.2	8.7	2.4	1.4	1.0
Editing <sup>2</sup>	(26)	4.8	12.0	40.9	39.9	1.0	1.4	(40)	33.2	30.3	17.3	8.7	9.1	1.4
Reducing and Sim- plying Scores	(27)	4.3	9.6	42.8	41.8	1.0	0.5	(41)	35.6	24.5	18.3	13.0	8.2	0.5
Transposing	(28)	2.4	1.0	23.1	71.2	2.4	0.0	(42)	16.8	22.1	19.7	21.6	19.7	0.0
Score Reading	(29)	2.4	3.4	15.9	74.5	2.9	1.0	(43)	13.9	12.5	22.1	19.2	31.3	1.0
Score Preparation	(30)	3.9	5.8	26.9	61.1	1.4	1.0	(44)	25.0	15.4	14.9	18.3	25.0	1.4

<sup>1</sup>Analysis (harmonic, formal, compositional techniques, etc.)

<sup>2</sup>Editing (altering interpretive aspects of a score)

- \*Little - Of Little or No Importance
- Relat. - Relatively Unimportant
- Desir. - Desirable if Possible
- Imper. - Imperative
- Error - Indicates the Percentage of Responses in the (E) Column of the Response Sheet
- Omits - No response indicated

Table 5

## PERCENTAGES FOR AURAL SKILLS

Indicate the degree to which you believe beginning music teachers NEED the following aural skills in their teaching:

Rate the approximate amount of time you believe beginning music teachers USE these aural skills in their teaching:

Aural Skill	Ques. No.	Response Categories*					Ques. No.	Response Categories					
		Little	Relat.	Desir.	Imper.	Error Omits		0-20%	21-40%	41-60%	61-80%	81-100%	Omits
Sight Singing (45)	1.4	0.5	12.0	81.3	4.8	0.0	(52)	12.0	11.5	16.4	20.7	39.4	0.0
Taking melodic dictation (46)	6.3	13.0	35.6	43.8	1.4	0.0	(53)	51.0	20.2	12.5	6.7	9.1	0.5
Taking harmonic dictation (47)	6.7	16.8	38.9	35.6	1.4	0.5	(54)	52.4	20.7	11.5	5.8	8.2	1.4
Taking rhythmic dictation (48)	4.8	10.1	29.8	52.9	2.4	0.0	(55)	43.3	20.2	15.4	10.6	10.1	0.5
Detecting melodic errors (49)	2.9	0.5	10.1	80.8	5.8	0.0	(56)	9.1	6.7	11.1	16.8	56.3	0.0
Detecting harmonic errors (50)	1.4	1.4	13.0	78.4	5.3	0.5	(57)	10.6	7.7	12.5	17.3	51.4	0.5
Detecting rhythmic errors (51)	1.4	1.0	11.5	80.3	5.8	0.0	(58)	8.7	6.7	10.1	15.9	58.2	0.5

\*Little - Of Little or No Importance  
 Relat. - Relatively Unimportant  
 Desir. - Desirable if Possible  
 Imper. - Imperative  
 Error - Indicates the Percentage of Responses in the (E) Column of the Response Sheet  
 Omits - No response indicated

Table 6

## PERCENTAGES FOR THEORETICAL KNOWLEDGE

Indicate the degree to which you believe beginning music teachers NEED the music theory knowledge of the following types of music:

Rate the approximate amount of time you believe beginning music teachers USE this music theory knowledge of the following types of music:

Music Theory Knowledge	Ques. No.	Response Categories*					Ques. No.	Response Categories						
		Little	Relat.	Desir.	Imper.	Error		Omits	0-20%	21-40%	41-60%	61-80%	81-100%	Omits
Ethnic <sup>1</sup>	(59)	3.9	7.7	48.1	37.5	2.9	0.0	(69)	28.4	27.4	16.8	16.8	9.6	1.0
Folk <sup>2</sup>	(60)	1.9	6.3	43.3	45.2	3.4	0.0	(70)	17.3	27.4	18.8	21.2	14.9	0.5
Pop <sup>3</sup>	(61)	0.5	5.3	40.9	49.0	3.9	0.5	(71)	13.9	23.1	25.0	20.7	16.4	1.0
Jazz	(62)	1.9	4.3	45.7	44.7	2.9	0.5	(72)	23.6	27.4	22.1	19.7	6.3	1.0
Renaissance	(63)	3.4	17.8	50.5	26.0	1.9	0.5	(73)	52.9	26.0	13.0	3.9	3.4	1.0
Baroque	(64)	2.4	9.6	47.1	37.5	2.9	0.5	(74)	39.4	26.4	23.1	5.8	4.3	1.0
Classical	(65)	1.0	4.8	48.1	43.3	2.9	0.0	(75)	26.4	29.8	28.9	8.2	6.3	0.5
Romantic	(66)	1.0	7.2	47.6	40.9	2.9	0.5	(76)	26.9	27.9	29.8	8.7	5.3	1.4
Modern	(67)	1.4	4.8	43.8	45.7	4.3	0.0	(77)	28.4	25.5	23.6	14.4	5.8	2.4
Avant-Garde <sup>4</sup>	(68)	3.4	11.5	45.2	35.5	2.9	0.5	(78)	43.3	18.3	20.7	10.1	2.9	4.8

<sup>1</sup> Ethnic (Black, American Indian, Latin American)

<sup>2</sup> Folk (Authentic American, British/American, Urban Folk)

<sup>3</sup> Pop (Rock, Musical Theatre, etc.)

<sup>4</sup> Avant-Garde (Electronic, Synthesized, etc.)

\*Little - Of Little or No Importance

Relat. - Relatively Unimportant

Desir. - Desirable if Possible

Imper. - Imperative

Error - Indicates the Percentage of Responses in the (E) column of the Response sheet

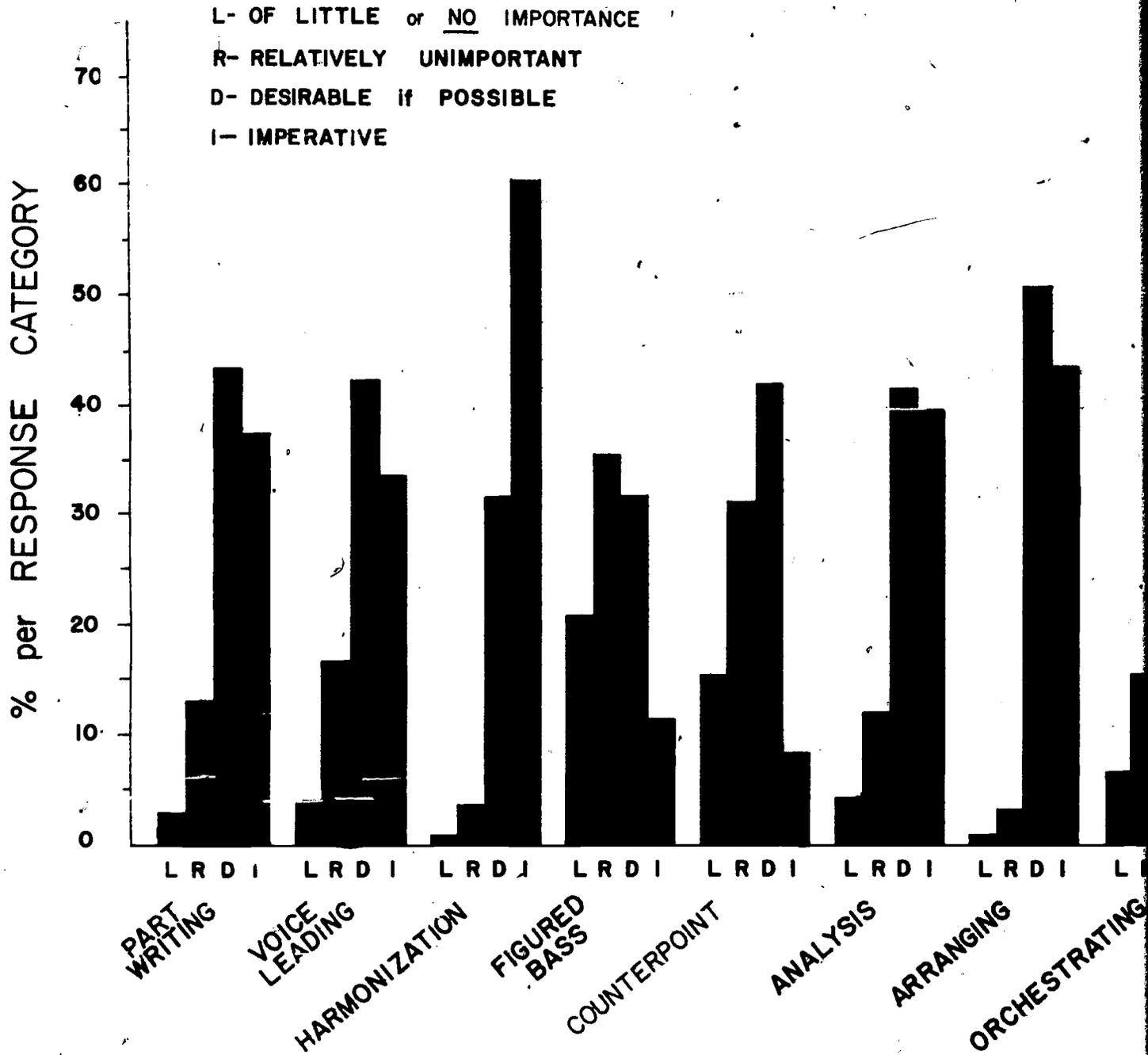
Omits - No response indicated

APPENDIX B

Bar Graphs

# BAR GRAPH 1

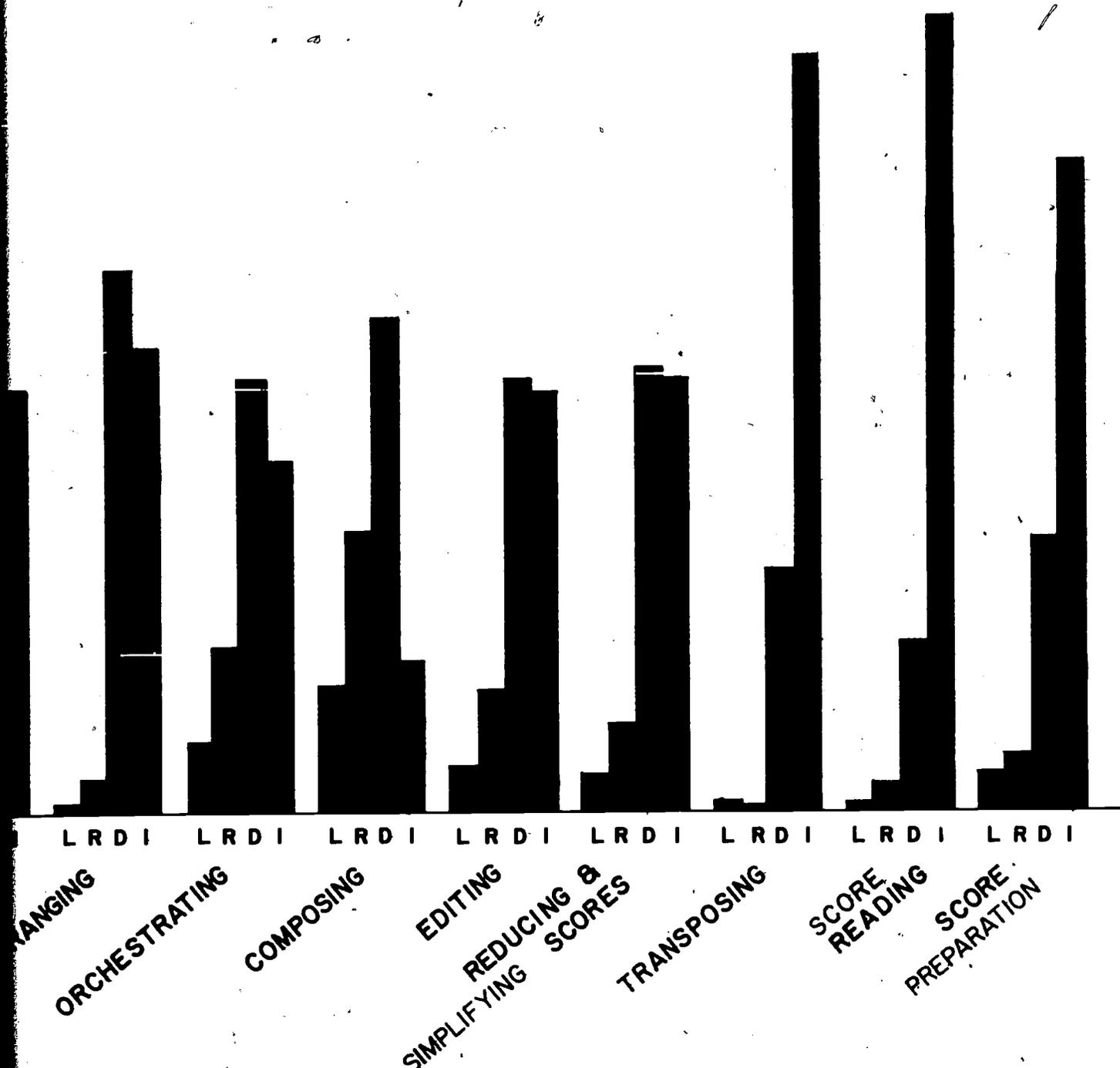
## WRITTEN SKILLS NE



RESPONSE CATEGO

PH 1

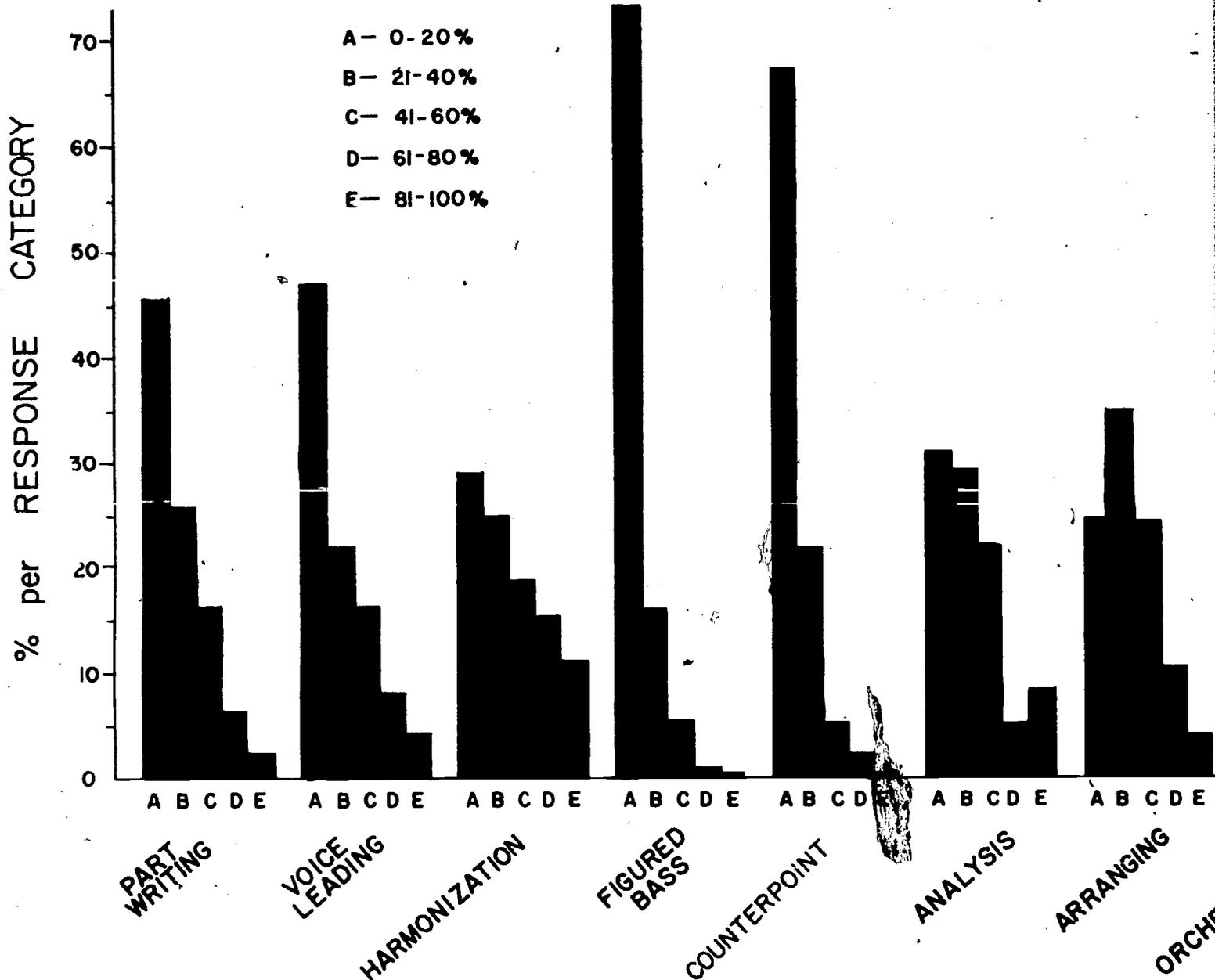
ILLS NEEDED



ISE CATEGORIES

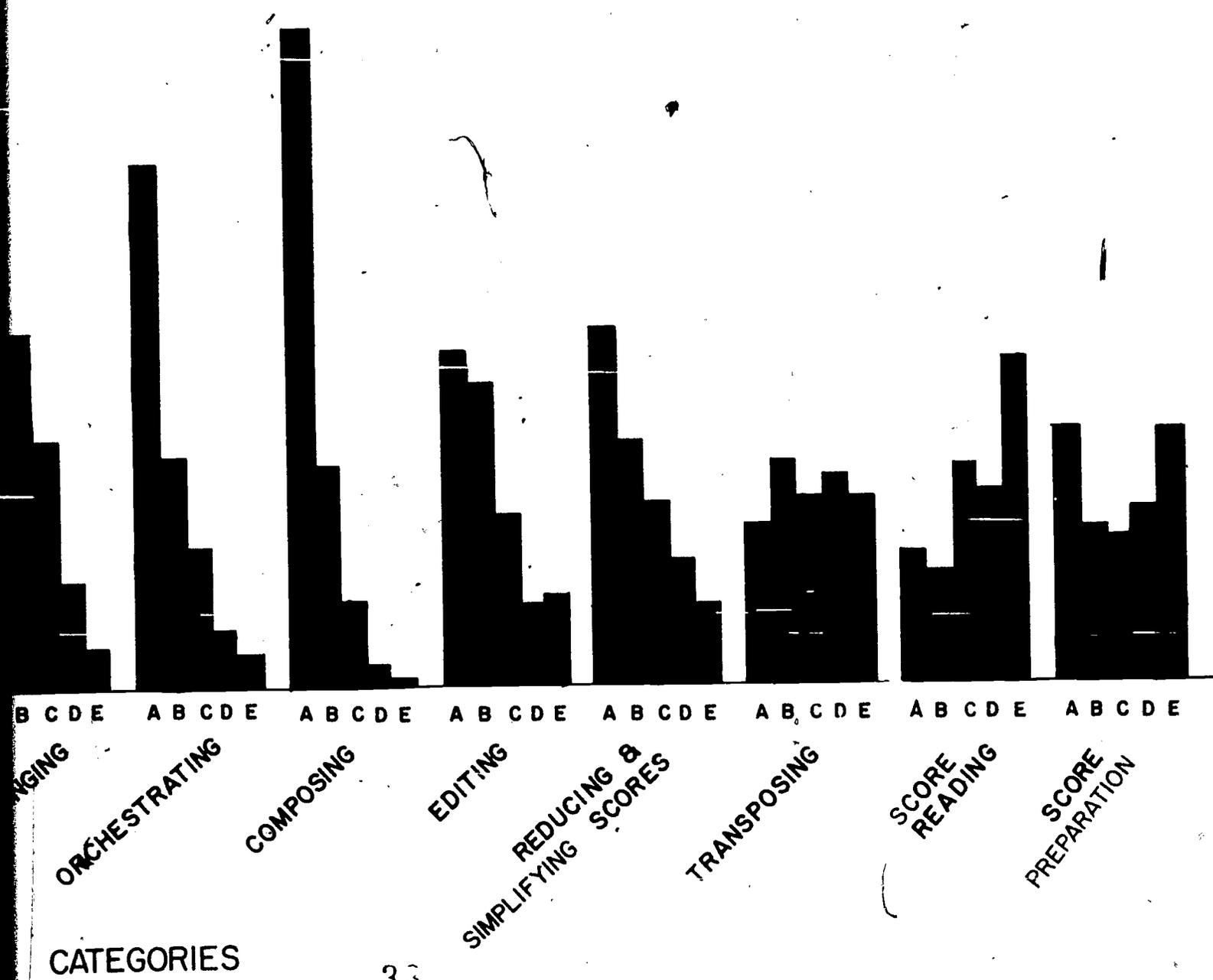
# BAR GRAPH 2

## WRITTEN SKILLS



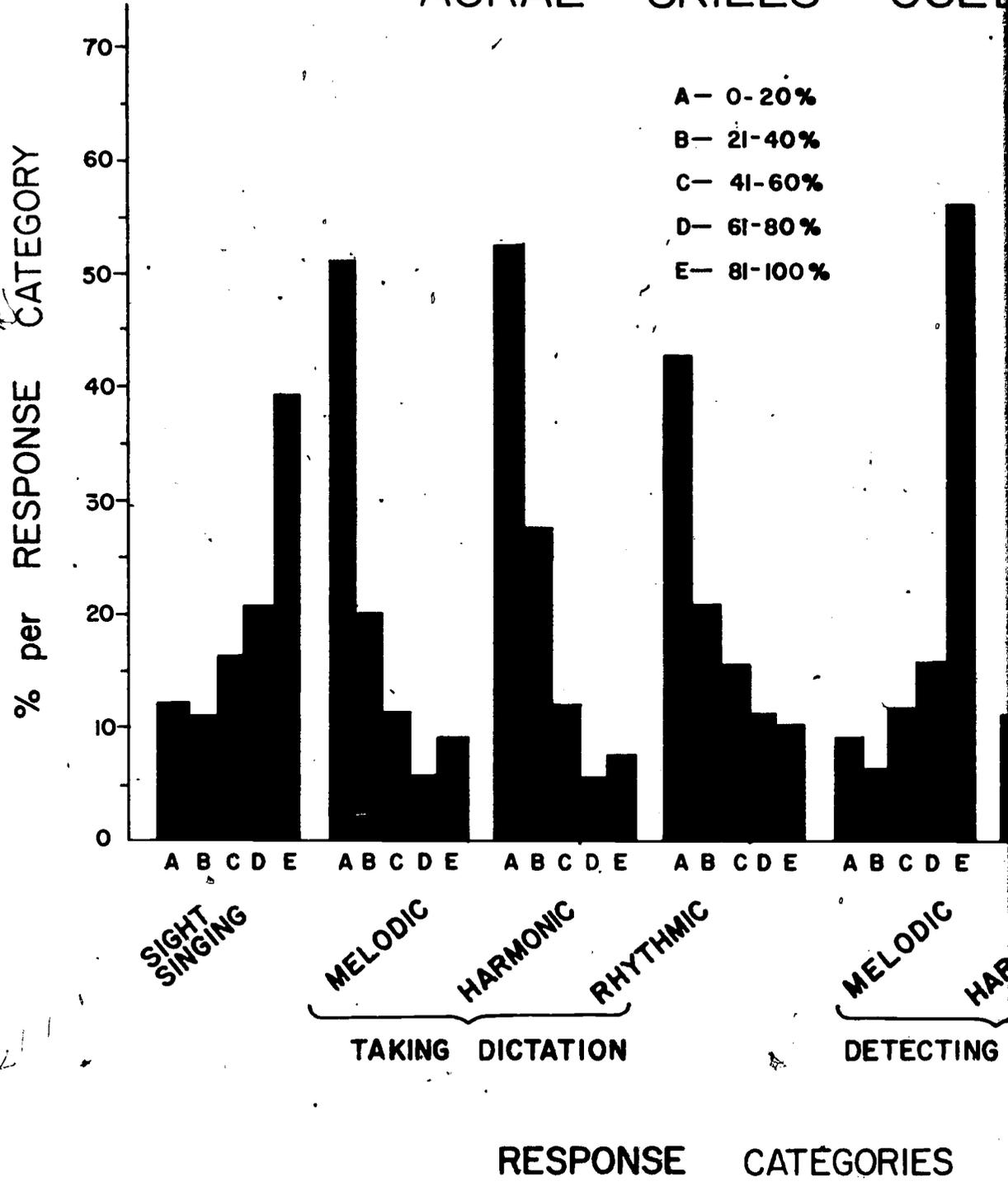
PH 2

ILLS USED



# BAR GRAPH 3

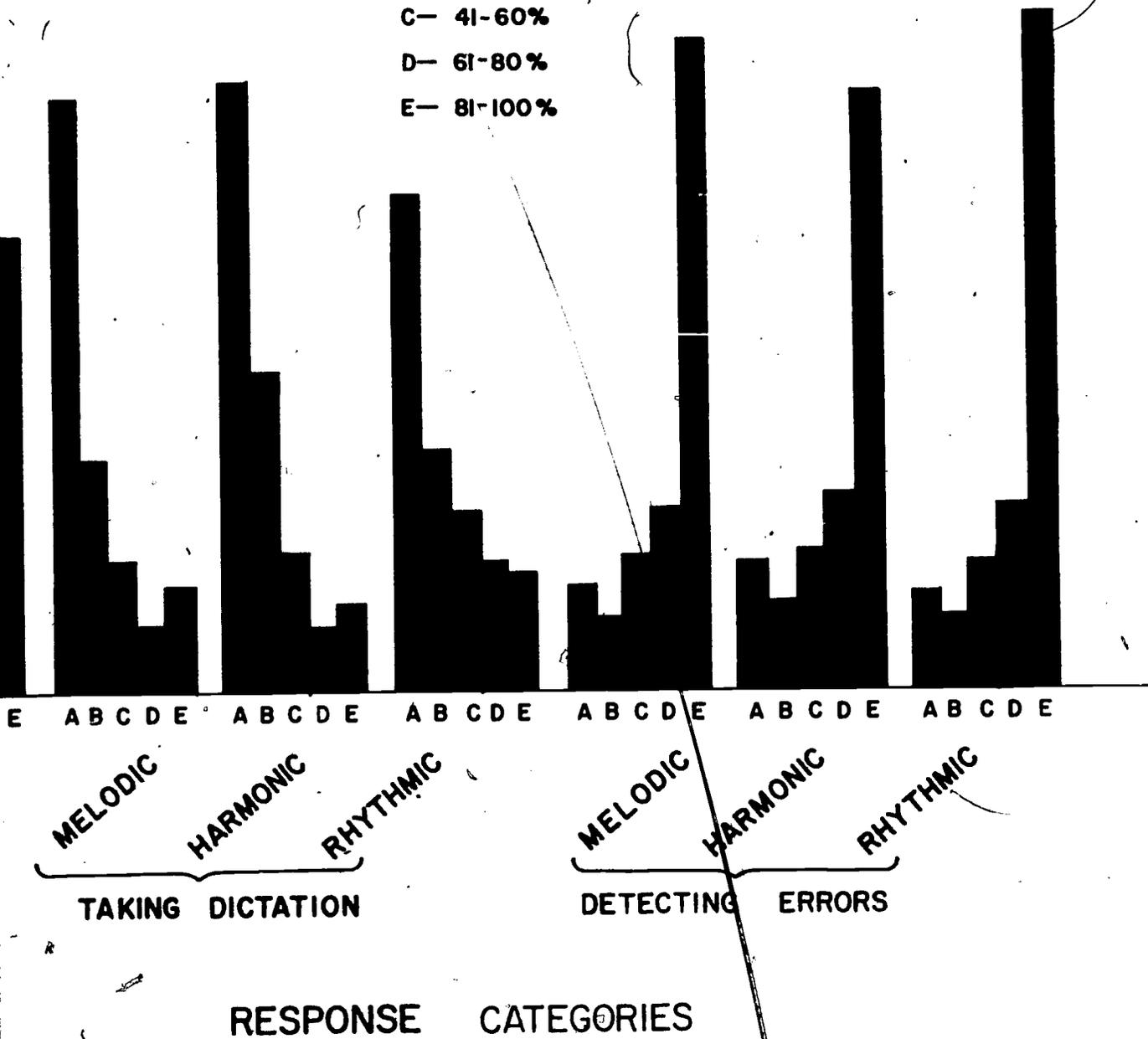
## AURAL SKILLS USED



# BAR GRAPH 3

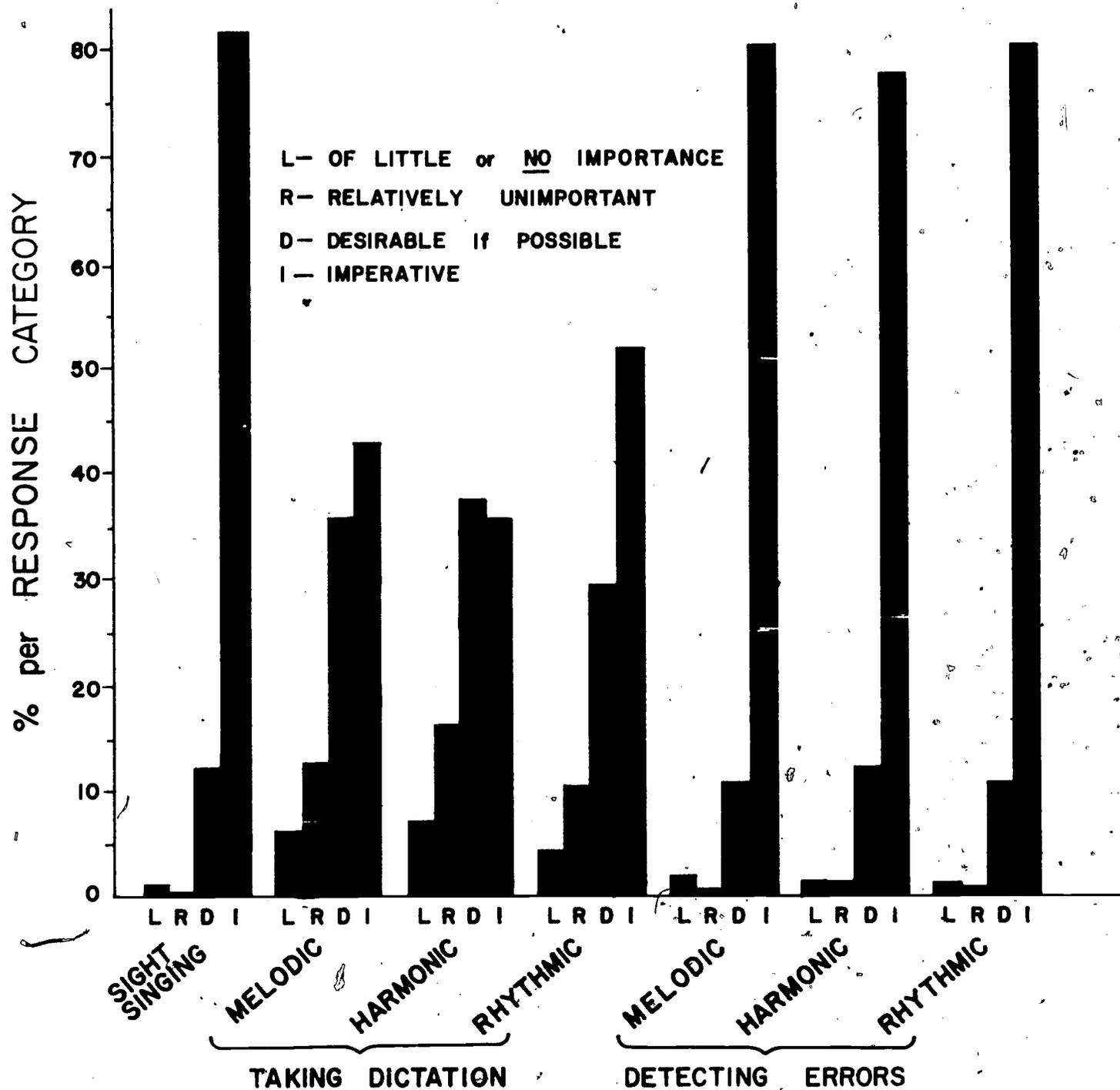
## AURAL SKILLS USED

- A - 0-20%
- B - 21-40%
- C - 41-60%
- D - 61-80%
- E - 81-100%



# BAR GRAPH 4

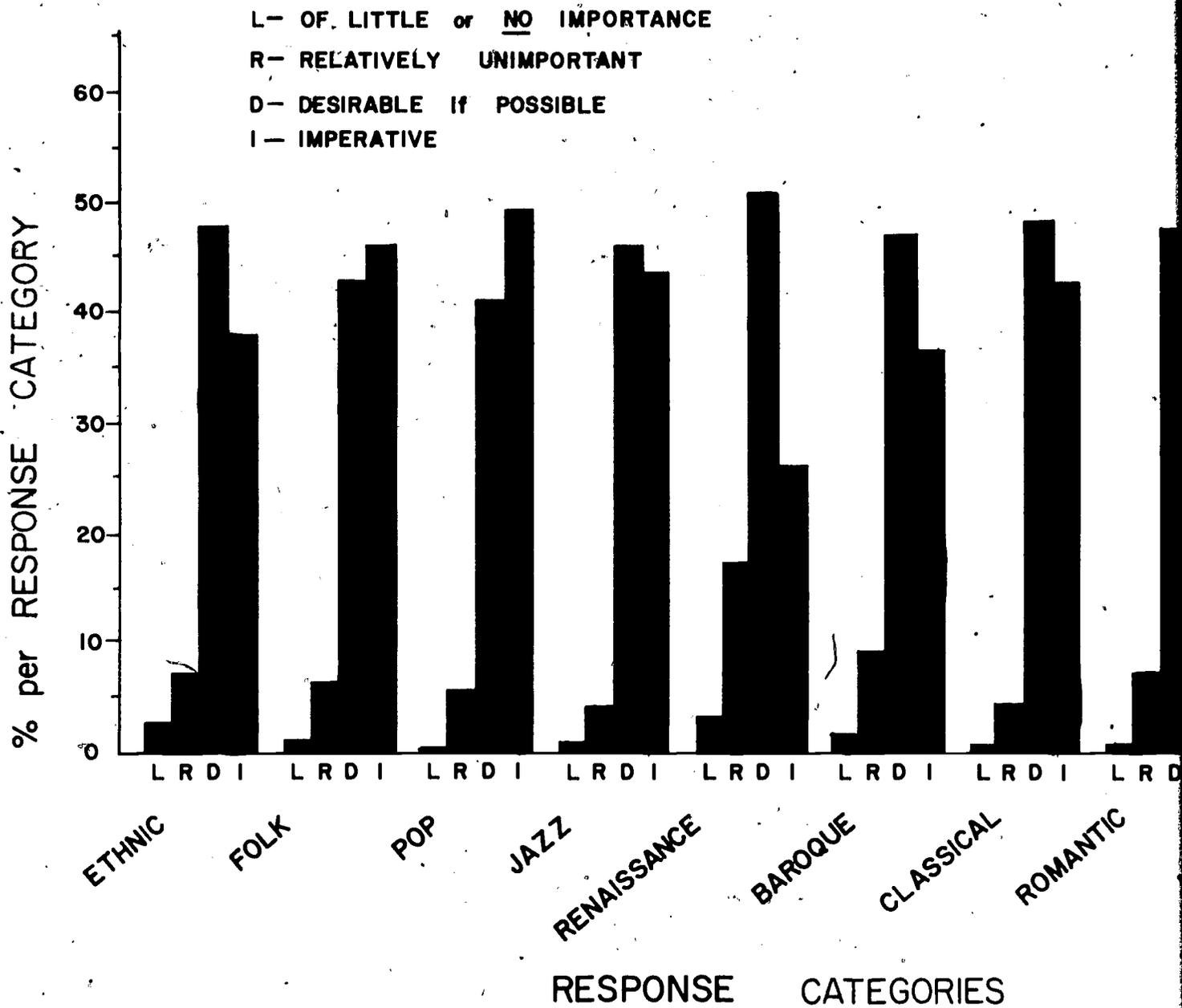
## AURAL SKILLS NEEDED



RESPONSE CATEGORIES

# BAR GRAPH 5

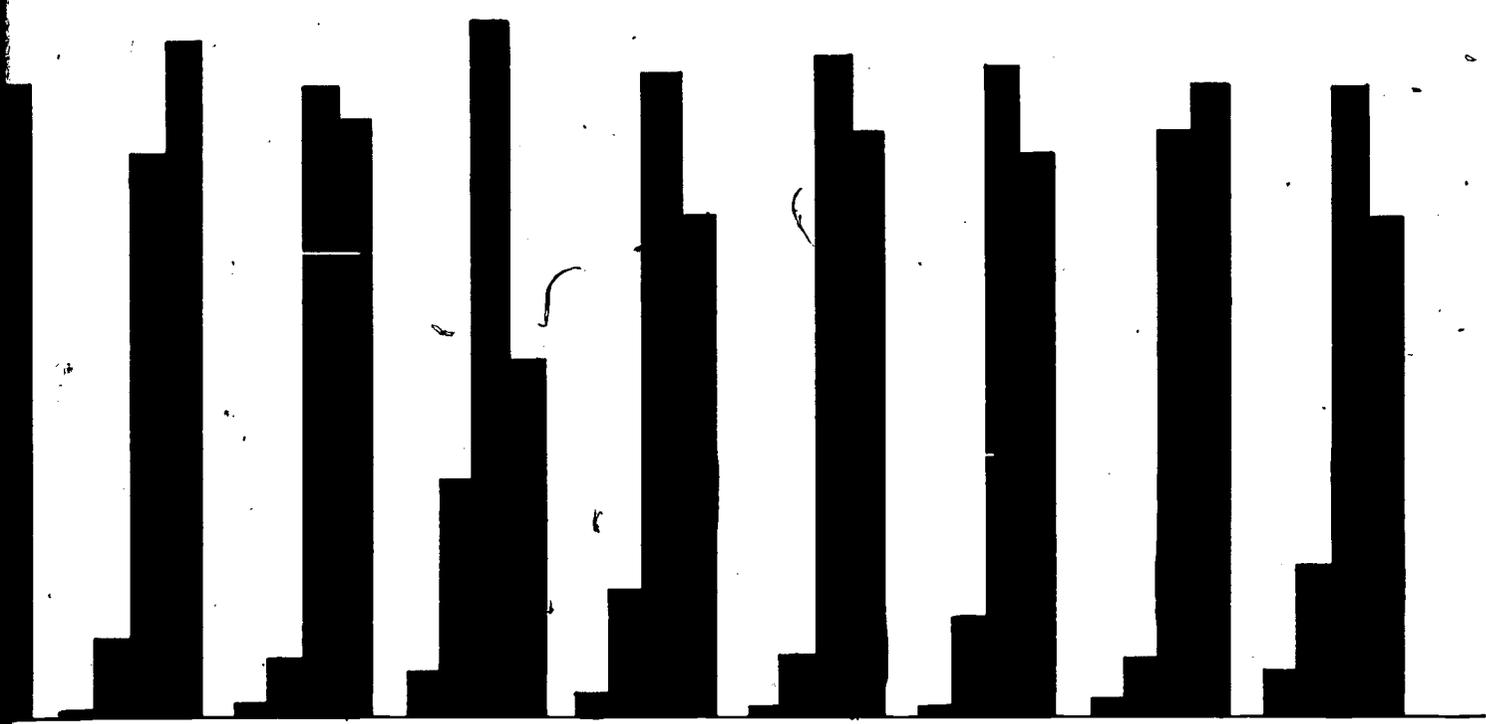
## MUSIC THEORY KNOWLEDGE NEED



# BAR GRAPH 5

## MUSIC THEORY KNOWLEDGE NEEDED

LITTLE or NO IMPORTANCE  
 HIGHLY UNIMPORTANT  
 AS MUCH AS POSSIBLE  
 IMPORTANT



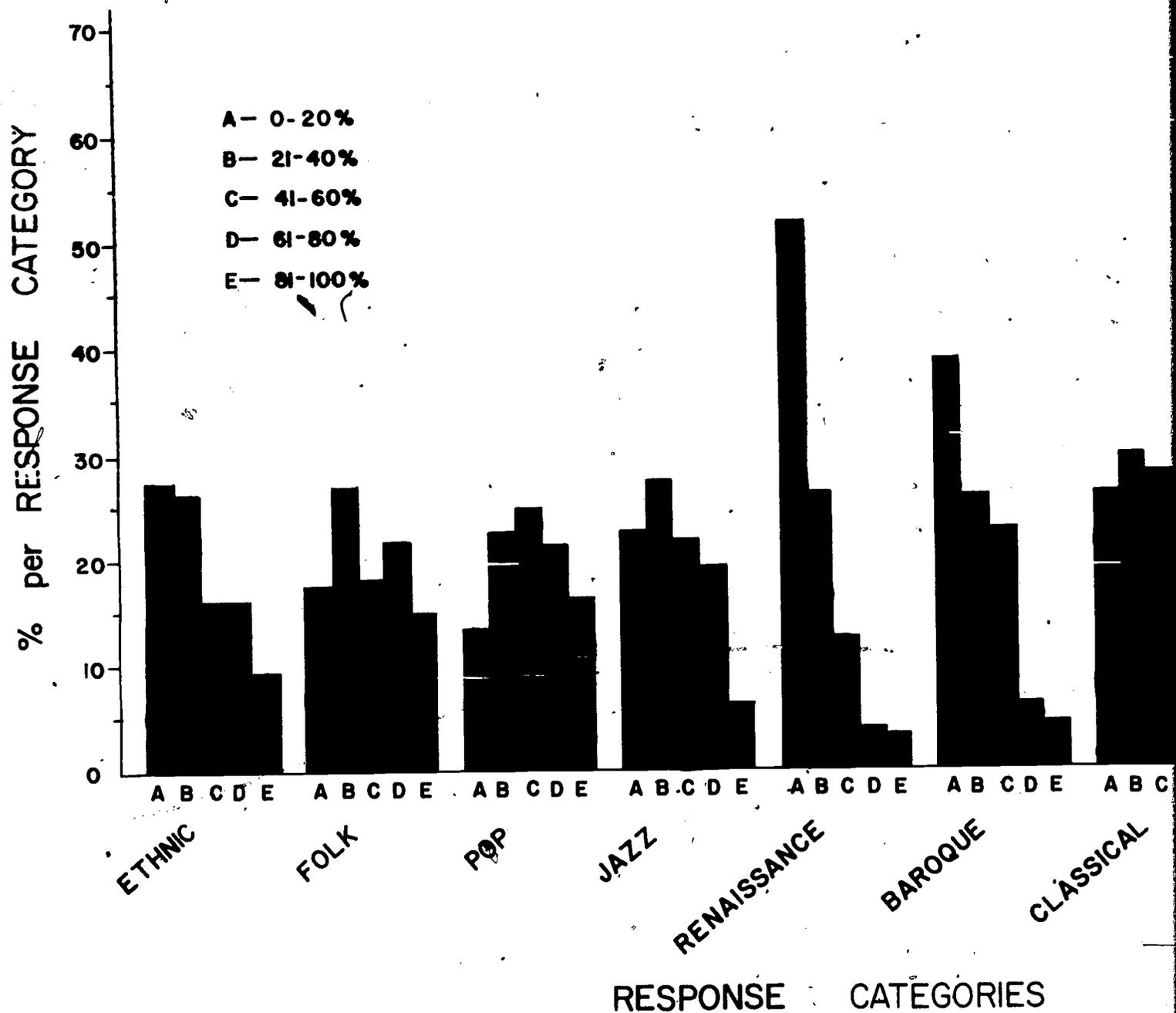
LR D I LR D I

POP JAZZ RENAISSANCE BAROQUE CLASSICAL ROMANTIC MODERN AVANT-GARDE

RESPONSE CATEGORIES

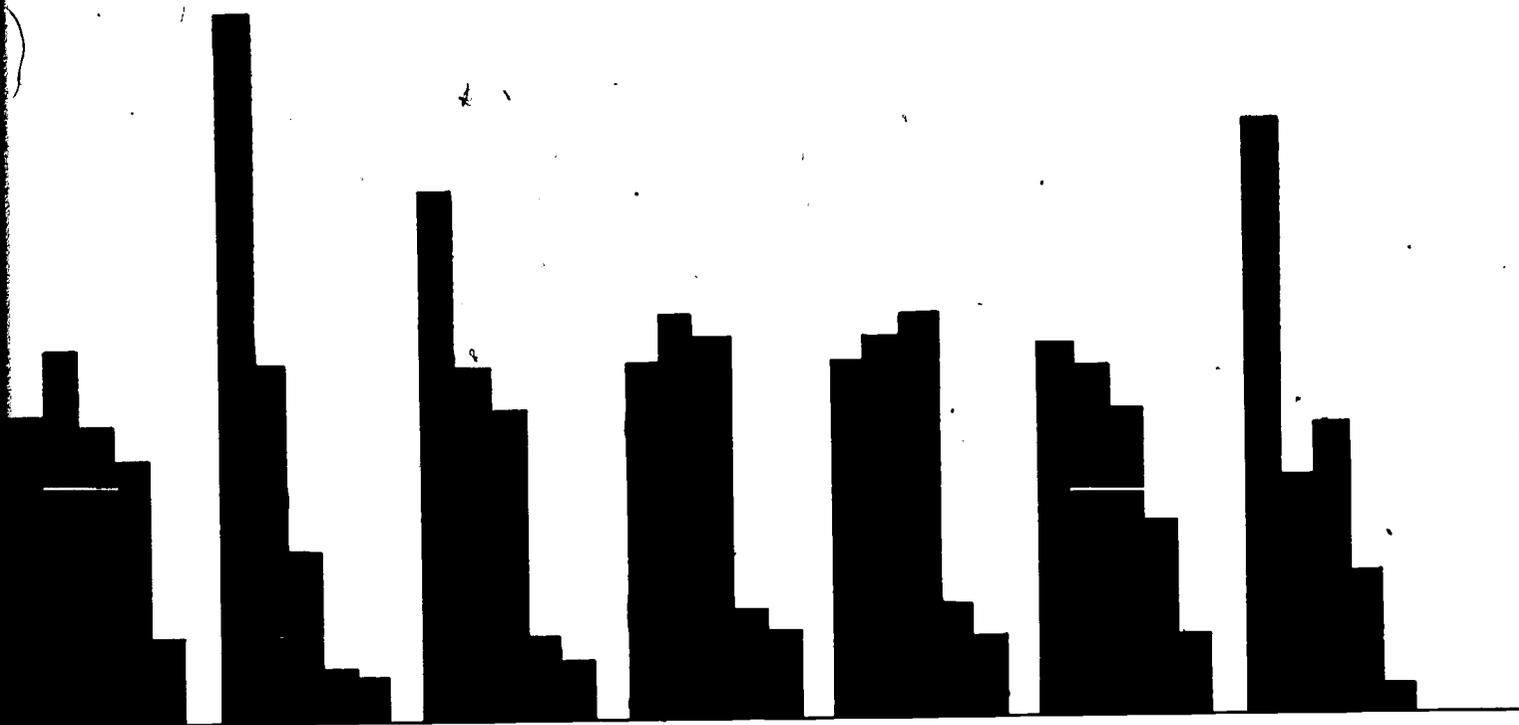
# BAR GRAPH 6

## MUSIC THEORY KNOWLEDGE



# BAR GRAPH 6

C THEORY KNOWLEDGE USED



A B C D E A B C D E A B C D E A B C D E A B C D E A B C D E A B C D E

JAZZ RENAISSANCE BAROQUE CLASSICAL ROMANTIC MODERN AVANT-GARDE

RESPONSE CATEGORIES

APPENDIX C  
Questionnaire



STATE UNIVERSITY COLLEGE • FREDONIA, NEW YORK 14063

DEPARTMENT OF MUSIC

Dear Music Teacher:

As you doubtlessly are aware, the certification procedure for teachers in the State of New York is being changed. In essence, new teachers soon will be asked to demonstrate the musical and teaching competencies they possess in order to be certified, rather than the current procedure which is based on the accumulation of courses and/or college credit hours. The question for colleges and universities seeking to comply with this change becomes, "What competencies should a beginning music teacher possess?".

We come to you with this question because we believe that your ideas and opinions are our most important source of information. Consequently, we prepared a questionnaire, the length of which became prohibitive. We chose, therefore, to divide the questionnaire into five different sections. Your name has been selected on a random basis from a list of the over 8000 music teachers in the State of New York to receive the theory section of this questionnaire.

We are asking you to take a few minutes of your time to answer the enclosed questionnaire. After you have registered your opinions on the blue response sheet please return it to us in the envelope provided. If you wish to provide additional comments, please feel free to write them on the back of the response sheet. It is necessary to return only the response sheet, and it is extremely important that it not be folded.

Please accept our sincere gratitude for your cooperation.

Sincerely,

Patrick T. McMullen, Ph.D.  
Director  
CBTE Research Project

PTMc:m

General Instructions: Using a #2 pencil, make marks dark and erase completely any marks you wish to change. It is not necessary that you supply any information in the areas designated for name, social security number, date, etc. Answer the following questions by selecting the desired answer on the questionnaire and marking the appropriate answer in the main section of the enclosed response sheet.

Questions		Responses			
		Yes	No	Part-Time	No
I will answer the questionnaire according to the area(s) or specialization which most closely describe(s) my own teaching duties (answer yes to more than one if applicable):					
1.	Instrumental	A	B		
2.	Choral/Vocal	A	B		
3.	General Music	A	B		
I will answer the questionnaire according to the level(s) which most closely describe(s) my own teaching duties (answer yes to more than one if applicable):					
4.	Elementary School	A	B		
5.	Middle School	A	B		
6.	Junior High School	A	B		
7.	Senior High School	A	B		
8.	Post-Secondary School	A	B		
I am:					
9.	A Music Teacher	A	B		C
10.	A Music Department Administrator	A	B		C
		Present	Past		Never
11.	A Non-Music Administrator	A	B		C
12.	A NYSSMA Member	A	B		C
13.	A County Music Association Officer	A	B		C
14. By the end of the current academic year I will have taught the number of years indicated at the right:					
		0-2 Years	3-5 Years	6-9 Years	10 or More Years
14.		A	B	C	D
15. Your school system would be classified as:					
		Urban	Suburban	Rural	Other
15.		A	B	C	D
16. Indicate the number of music teachers in your school district:					
		1-4	5-10	11 or More	
16.		A	B	C	

Indicate the degree to which you believe beginning music teachers NEED the following written skills in their teaching:	Of Little or No Importance	Relatively Unimportant	Desirable if Possible	Imperative	
17. Part writing	A	B	C	D	
18. Voice leading	A	B	C	D	
19. Harmonization	A	B	C	D	
20. Figured bass	A	B	C	D	
21. Counterpoint	A	B	C	D	
22. Analysis (harmonic, formal, compositional techniques, etc.)	A	B	C	D	
23. Arranging	A	B	C	D	
24. Orchestrating	A	B	C	D	
25. Composing	A	B	C	D	
26. Editing (altering interpretive aspects of a score)	A	B	C	D	
27. Reducing and simplifying scores	A	B	C	D	
28. Transposing	A	B	C	D	
29. Score reading	A	B	C	D	
30. Score preparation	A	B	C	D	
Rate the approximate amount of time you believe beginning music teachers actually USE these written skills in their teaching:	0-20%	21-40%	41-60%	61-80%	81-100%
31. Part writing	A	B	C	D	E
32. Voice leading	A	B	C	D	E
33. Harmonization	A	B	C	D	E
34. Figured bass	A	B	C	D	E
35. Counterpoint	A	B	C	D	E
36. Analysis (harmonic, formal, compositional techniques, etc.)	A	B	C	D	E
37. Arranging	A	B	C	D	E
38. Orchestrating	A	B	C	D	E
39. Composing	A	B	C	D	E
40. Editing (altering interpretive aspects of a score)	A	B	C	D	E
41. Reducing and simplifying scores	A	B	C	D	E
42. Transposing	A	B	C	D	E
43. Score reading	A	B	C	D	E
44. Score preparation	A	B	C	D	E

Indicate the degree to which you believe beginning music teachers NEED the following aural skills in their teaching:

45. Sight singing
46. Taking melodic dictation
47. Taking harmonic dictation
48. Taking rhythmic dictation
49. Detecting melodic errors
50. Detecting harmonic errors
51. Detecting rhythmic errors

Rate the approximate amount of time you believe beginning music teachers actually USE these aural skills in their teaching:

52. Sight singing
53. Taking melodic dictation
54. Taking harmonic dictation
55. Taking rhythmic dictation
56. Detecting melodic errors
57. Detecting harmonic errors
58. Detecting rhythmic errors

Indicate the degree to which you believe beginning music teachers NEED the music theory knowledge of the following types of music:

59. Ethnic (Black, American Indian, Latin American)
60. Folk (authentic American, British/American, Urban Folk)
61. Pop (Rock, Musical Theatre, etc.)
62. Jazz
63. Renaissance
64. Baroque
65. Classical
66. Romantic
67. Modern
68. Avant-Garde (electronic, synthesized, etc.)

Of Little or No Importance

Relatively Unimportant

Desirable if Possible

Imperative

- |     |   |   |   |   |
|-----|---|---|---|---|
| 45. | A | B | C | D |
| 46. | A | B | C | D |
| 47. | A | B | C | D |
| 48. | A | B | C | D |
| 49. | A | B | C | D |
| 50. | A | B | C | D |
| 51. | A | B | C | D |

0-20%      21-40%      41-60%      61-80%      81-100%

- |     |   |   |   |   |   |
|-----|---|---|---|---|---|
| 52. | A | B | C | D | E |
| 53. | A | B | C | D | E |
| 54. | A | B | C | D | E |
| 55. | A | B | C | D | E |
| 56. | A | B | C | D | E |
| 57. | A | B | C | D | E |
| 58. | A | B | C | D | E |

Of Little or No Importance

Relatively Unimportant

Desirable if Possible

Imperative

- |     |   |   |   |   |
|-----|---|---|---|---|
| 59. | A | B | C | D |
| 60. | A | B | C | D |
| 61. | A | B | C | D |
| 62. | A | B | C | D |
| 63. | A | B | C | D |
| 64. | A | B | C | D |
| 65. | A | B | C | D |
| 66. | A | B | C | D |
| 67. | A | B | C | D |
| 68. | A | B | C | D |

Rate the approximate amount of time you believe beginning music teachers actually USE this music theory knowledge of the following types of music:

- 69. Ethnic (Black, American Indian, Latin American)
- 70. Folk (authentic American, British/American, Urban Folk)
- 71. Pop (Rock, Musical Theatre, etc.)
- 72. Jazz
- 73. Renaissance
- 74. Baroque
- 75. Classical
- 76. Romantic
- 77. Modern
- 78. Avant-Garde (electronic, synthesized, etc.)

0-20%	21-40%	41-60%	61-80%	81-100%
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E
A	B	C	D	E



ABSTRACT

Music Theory Knowledge and Skills  
for the Beginning Music Teacher:  
A Descriptive Survey Report

by

Patrick T. McMullen  
and  
Daniel J. Bauman

State University College  
Fredonia, New York

1975

One of the major criticisms of the CBTE movement has been the lack of available research on which to base the development of competency-based programs. A search of the literature indicates that the amount of research examining this topic is extremely limited in both amount and depth. This is especially true as it applies to music programs. It is, therefore, the purpose of a study by the Music Education Department (SUNY, Fredonia), in cooperation with the Teacher Education Research Center (SUNY, Fredonia), to take a first step in filling this gap by seeking input from public school music teachers in New York State. The ultimate goal of the project is to describe the knowledge and skills felt to be the most needed and predominantly used by the beginning music teacher.

The specific aims of the first section of this project (Music Theory) were to seek opinions of New York State public school music teachers: (1) to obtain an initial profile of the knowledge and skills needed and actually used by the beginning music teacher in the areas of aural skills, written skills, combined aural and written skills, and theoretical knowledge of musical types; and (2) to determine if this profile of knowledge and skill areas will vary when examined by area of specialization and level of teaching duties.

The survey instrument used in the study incorporated extensive modification which developed out of pilot studies on earlier questionnaires. The resultant questionnaire consisted of an information section and content section. The information section was included at the beginning of each questionnaire so that the responses could be classified by teaching level, area of specialization, years of teaching and socio-economic setting. The content section consisted

of three sections dealing with aural skills, written skills and theoretical knowledge of musical types. For each of these content sections the questionnaire asked (1) to what extent the teacher felt these knowledge and skills were needed, and (2) the approximate percentage of time each was used by the beginning teacher.

A sample was selected randomly from the total population of 7,263 public school music teachers in New York State. From the 400 questionnaires sent to public school teachers, 208 response sheets (or 52%) were returned.

An analysis of the data for the written skills reveals several trends that appear consistent for need and use. First, skills associated with score reading, score preparation and transposition appear to be predominant. A grouping which includes harmonization, editing, analysis, reducing and simplifying scores, seem to form a second category. A third group associated with voice leading and part writing appear to be needed and used less than the previous group. Finally, composing, figured bass and counterpoint are the least needed and used.

The aural skills most needed are those of sightsinging and detecting errors of all types. In terms of use, detecting errors are predominant followed by sightsinging. The skills associated with taking dictation of all types seem to be the least needed and used.

When examined across aural and written skills the following trend emerges, which is relatively consistent for both need and use. First, detecting errors of all types--melodic, harmonic and rhythmic followed closely by sightsinging received the predominant

percentages. Second in importance both in need and use are the skills associated with score reading and preparation (including transposition). It was also quite evident that the aural and written skills needed and used the least are those of figured bass and counterpoint.

In the theoretical knowledge of music types section, the data for the needs section, while giving a slight weighting toward the pop-commercial (as vs. serious) type of music, does not appear to present a trend. On the use side, the following trend develops: Folk, Pop, and Ethnic music are used most often, followed by Jazz, Modern, Classical, Romantic, and Baroque. At the bottom of the rank-ordered list in terms of usage are Renaissance and Avant-Garde.

When examined by areas of specialization, the results would appear to be a matter of degree rather than direction. In the needs section, all of the differences were a matter of degree, while in the use section, initial interpretation would appear to suggest that general and choral/vocal teachers use traditional theory skills such as harmonization and analysis to a greater extent than do instrumental teachers. The instrumental teacher is more concerned with skills associated with score preparation.

When examined according to level of teaching duties, the differences are again more a matter of degree than direction. The one possible exception to this was in the skills associated with preparing scores. In this area, the senior high school teachers use score preparation more than the elementary, middle, or junior high school teachers. Related skills such as transposing and score reading also tend to show this distinction, although to a lesser degree.

It was the intent of this project to develop an initial profile of knowledge and skills a beginning teacher needs and uses, and to determine if this profile varies when examined across areas and levels of specialization. While results of this study do not define a complete profile, especially because of the limitations of the survey technique, the results of the theory section of this project do serve to "carve out" areas of importance.